

REMARKS

I. Interview Summary

Applicant acknowledges with appreciation the time and cooperation extended by the Examiner in granting a telephonic interview with Applicant's representative on July 15, 2009. During the interview, the issues raised in the Final Office Action mailed April 13, 2009, were discussed. An agreement with respect to the claims was not reached. The substance of the interview is included in the remarks below.

II. Status of the Claims

The Final Office Action mailed April 13, 2009, objected to claims 1-45¹; rejected claims 27-29 under 35 U.S.C. § 101; rejected claims 1-14, 17-19, 21, 22, 27, 28, 30-35, 38-42, and 45 under 35 U.S.C. § 103(a) as being unpatentable over *Partridge et al.* (U.S. Patent No. 6,160,811) in view of *Mikkonen* (U.S. Patent No. 6,885,633), and further in view of *Bommareddy et al.* (U.S. Patent No. 6,880,089); and rejected claims 15, 16, 24-26,² 29, 36, 37, 43, and 44 under 35 U.S.C. § 103(a) as being unpatentable over *Partridge et al.*, *Mikkonen*, *Bommareddy et al.*, and further in view of *End, III* (U.S. Patent No. 7,185,041) ("*End*").

By this Amendment, Applicant amends claims 1, 3, 4, 7, 10, 13, 14, 17, 21, 22, 24-31, 34, 35, 37-39, 41, 42, 44, and 45 and cancels claims 8, 9, and 19. Claims 1-7, 10-18, 21, 22, and 24-45 remain pending.

1. Claims 20 and 23 were cancelled by the Amendment filed on March 11, 2008.

2. Although the heading on page 11 of the Office Action does not indicate claim 24 is rejected based on *Partridge*, *Mikkonen*, *Bommareddy et al.*, and *End*, the Office Action rejects claim 24 based on these references on pages 12-13.

III. Objection to claims 1-45

The Final Office Action objected to claims 1-45 as being unclear. (*Final Office Action*, p. 2.) Applicant has amended the claims to replace the term “processor” with “processing unit.” As discussed during the telephonic interview, the specification defines the claimed “processing unit” as hardware. (See, e.g., *Specification*, ¶¶ 027 and 030.) Accordingly, pending claims 1-7, 10-18, 21, 22, and 24-45 clearly recite statutory subject matter. Applicant thereby respectfully requests that the objection to claims 1-7, 10-18, 21, 22, and 24-45 be withdrawn.

IV. Rejection of claims 27-29 under 35 U.S.C. § 101

The Final Office Action rejected claims 27-29 under 35 U.S.C. § 101 as being directed towards non-statutory subject matter. (*Final Office Action*, p. 3.) As discussed above, claims 27-29 have been amended to include the term “processing unit,” which as defined by the specification is hardware. Hardware is clearly statutory subject matter. Accordingly, Applicant respectfully requests that the rejection of claims 27-29 under 35 U.S.C. § 101 be withdrawn.

V. Rejections of claims 1-7, 10-18, 21, 22, and 24-45 under 35 U.S.C. § 103(a)

Applicant respectfully traverses the rejection of claims 1-7, 10-18, 21, 22, and 24-45 under 35 U.S.C. § 103(a). A *prima facie* case of obviousness has not been established at least because the differences between the prior art and Applicant's claims are such that it would not have been obvious for one of ordinary skill in the art at the time of the invention to modify the prior art to arrive at Applicant's claimed invention.

Amended claim 1 recites a “method for addressing packets in a firewall cluster within a single network, the firewall cluster including a plurality of firewall nodes

comprising one or more processing units.” One function of a firewall node is to direct traffic (e.g., data packets) from a first network to a second network. In the process of directing traffic, a first firewall node may translate or modify the address of the source address and source port of an incoming packet to the source address of the firewall cluster and source port of the first firewall node. *Specification*, ¶ 035. In some instances, the modified address created by the first firewall node may conflict with a modified address created by a second firewall node. *Id.* The claimed invention as recited in claim 1 prevents address conflicts by, among other things:

modifying, by the first processing unit, as a function of a multidimensional space for representing addresses processed by a set of processing units, a first address for the first packet into a second address for the first packet, the second address being within a range of addresses assigned only to the first firewall node;

[and]

modifying, by the second processing unit, as a function of a multidimensional space for representing addresses processed by a set of processing units, a first address for the second packet into a second address for the second packet, the second address being within a range of addresses assigned only to the second firewall node, such that the second address of the second packet does not conflict with the second address of the first packet.

Partridge et al., *Mikkonen*, *Bommareddy et al.*, and *End*, at a minimum, fail to teach or suggest modifying a first address for the first packet and modifying a first address for the second packet, as recited in claim 1. For example, *Partridge et al.* and *End* do not teach or suggest a firewall cluster or node. Instead, *Partridge et al.* discloses a router for forwarding packets based on “routing table information” and “various interface cards.” *Partridge et al.*, 5:2-6. *End* merely discloses a “circuit and

method for high-speed execution of modulo division operations.” *End*, 1:7-8. *Mikkonen* discloses that a node within a network may forward network traffic based on network interfaces. *Mikkonen*, 3:9-13.

Bommareddy et al. does disclose the use of “firewalls [to] perform filtering operations and/or network address translation (NAT) services.” *Bommareddy et al.*, 6:57-60. However, as disclosed by *Bommareddy et al.*, NAT is simply used “to modify each packet, changing the destination address from its IP address to the actual address of the server that is to receive the traffic” and “to modify the ‘From’ address in each packet to create the appearance that the PC load balancer sent the packets.” *Id.* at 2:38-44.

None of *Partridge et al.*, *Mikkonen*, *Bommareddy et al.*, and *End* teach or suggest modifying addresses in a manner that prevents address conflicts. Specifically, none of *Partridge et al.*, *Mikkonen*, *Bommareddy et al.*, and *End* teach or suggest “modifying, by the first processing unit, as a function of a multidimensional space for representing addresses processed by a set of processing units, a first address for the first packet into a second address for the first packet, the second address being within a range of addresses assigned only to the first firewall node” and “modifying, by the second processing unit, as a function of a multidimensional space for representing addresses processed by a set of processing units, a first address for the second packet into a second address for the second packet, the second address being within a range of addresses assigned only to the second firewall node, such that the second address of the second packet does not conflict with the second address of the first packet,” as

recited in claim 1. *Partridge et al.*, *Mikkonen*, *Bommareddy et al.*, and *End*, thereby fail to teach or suggest all elements of independent claim 1.

For at least the above reasons, the Final Office Action has neither properly determined the scope and content of the prior art nor properly ascertained the differences between the prior art and claim 1. Accordingly, the Final Office Action has not clearly articulated a reason as to why amended independent claim 1 would have been obvious to one of ordinary skill in view of the prior art. Therefore, a *prima facie* case of obviousness has not been established for independent claim 1. Applicant thereby respectfully requests that the rejection of claim 1 be withdrawn and the claim allowed.

Independent claims 10, 24, 27-31, 37, 38, 44, and 45, while of different scope than claim 1, distinguish over *Partridge et al.*, *Mikkonen*, *Bommareddy et al.*, and *End* for at least similar reasons as those noted above for claim 1. Accordingly, Applicant also respectfully requests the withdrawal of the rejection of independent claims 10, 24, 27-31, 37, 38, 44, and 45 under 35 U.S.C. § 103(a) and the timely allowance of the claims.

Claims 2-7, 11-18, 21, 22, 25-26, 32-36, and 39-43 depend from independent claims 1, 10, 24, 31, and 38 and therefore patentably distinguish from *Partridge et al.*, *Mikkonen*, *Bommareddy et al.*, and *End* for at least the reasons discussed above. Accordingly, Applicant also respectfully requests withdrawal of the rejection of dependent claims 2-7, 11-18, 21, 22, 25-26, 32-36, and 39-43 under 35 U.S.C. § 103(a) and the timely allowance of the claims.

CONCLUSION


Applicant respectfully requests reconsideration of this application and the timely allowance of the pending claims. The preceding remarks are based on the on the arguments presented in the Final Office Action and, therefore, do not address patentable aspects of the invention that were not addressed by the Examiner in the Final Office Action. The pending claims include other elements that are not shown, taught, or suggested by the cited art. Accordingly, the preceding remarks in favor of patentability are advanced without prejudice to other bases of patentability. Furthermore, the Final Office Action contains a number of statements reflecting characterizations of the related art and the claims. Regardless of whether any such statement is identified herein, Applicant declines to automatically subscribe to any statement or characterization in the Final Office Action.

Please grant any extensions of time required to enter this response and charge any additional required fees to our deposit account 06-0916.

Respectfully submitted,

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